(19) World Intellectual Property Organization

International Bureau





(43) International Publication Date 9 June 2005 (09.06.2005)

PCT

(10) International Publication Number WO 2005/052518 A1

(51) International Patent Classification⁷: G01D 5/16, G01B 7/30

(21) International Application Number:

PCT/EP2004/052719

(22) International Filing Date: 29 October 2004 (29.10.2004)

(25) Filing Language:

English

(26) Publication Language:

English

(30) Priority Data:

03104380.5 26 November 2003 (26.11.2003) EP

(71) Applicant (for all designated States except US): INTER-NATIONAL BUSINESS MACHINES CORPORA-TION [US/US]; New Orchard Road, Armonk, NY 10504 (US).

(72) Inventors; and

(75) Inventors/Applicants (for US only): DIETZEL, Andreas [DE/DE]; Auf der Benn 17A, 55578 Wallertheim (DE). BREUER, Marcus [DE/DE]; Falkensteiner Str. 4, 55278 Dalheim (DE). GRIMM, Hubert [DE/DE];

Hindenburger Str. 50, 55278 Mommenheim (DE). LEHN-ERT, Karl-Heinz [DE/DE]; Kapellenstr. 24, 55124 Mainz (DE). LUCKNER, Nikolaus [DE/DE]; Auf der Bitz 19, 55270 Ober-Olm (DE). SCHAEFER, Rolf [DE/DE]; Fliederstr. 14, 65396 Walluf (DE). MICHAELIS, Guenther [DE/DE]; Am Stadtbad 3, 55276 Oppenheim (DE).

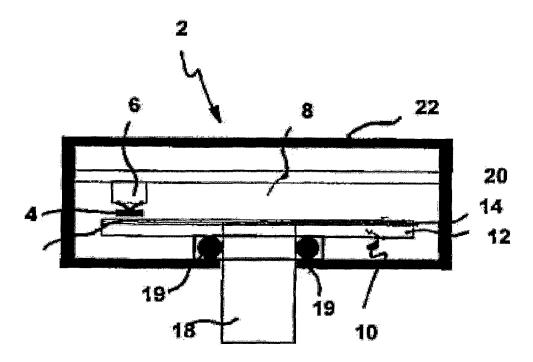
(74) Agent: KLEIN, Hans-Jörg; c/o IBM, Pascalstr. 100, 70569 Stuttgart (DE).

(81) Designated States (unless otherwise indicated, for every kind of national protection available): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated States (unless otherwise indicated, for every kind of regional protection available): ARIPO (BW, GH,

[Continued on next page]

(54) Title: MAGNETIC ENCODER



(57) Abstract: A high-resolution magnetic encoder system, comprising a magnetic sensor mounted on a fixed suspension above a magnetic medium is provided, wherein the magnetic medium carries at least one magnetic track. The sensor moves in close contact on the surface of said magnetic medium, which is protected by a hard cover layer.

WO 2005/052518 A1



GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:

with international search report

 before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.